





**DIESEL GENERATOR** 

**FUEL OPTIMISED** 

### ELECTRICAL

			Pri	ime	Star	ıdby			
Frequency (Hz)	Phases	Voltage (V)	kVA	kW	kVA	kW	MCB Rating (A)	Minimum ATP Rating (A)	Rated Speed (RPM)
50	3	400/230V	80.0	64.0	88.0	70.4	125	125	1500
60	3	380/220V	85.0	68.0	93.5	74.8	160	160	1800
60	3	220/I27V	88.0	70.4	96.8	77.4	250	250	1800
60	3	208/I20V	88.0	70.4	96.8	77.4	250	250	1800

POWER FACTOR	
3 Phase	0.8
I Phase	I

MAXIMUM LOAD IMPACT*				
kVA	48			
kW 38.40				

\*With 20% voltage and 10% frequency deviation @ 50Hz 400V

#### **ALL RATINGS ARE TO STANDARD REFERENCE CONDITIONS ISO 8528**

**Prime:** This rating is for the supply of continuous electrical power, at variable load, in lieu of commercially purchase power. There is no limitation on the annual hours of operation and 10% over load power can be supplied for 1 hour in 12.

**Standby:** Standby Power (ESP) is the maximum output available, for up to 200 hours per year, where the average load (variable) does not exceed 70% of the standby power rating. No overload is available.

Stage IIIA Models are only emissions compliant at 50Hz Prime Power in accordance with 97-68EC.

# **G90QS** | Canopy Set



CANOPY/SKID	
Lockable Maintenance Access Doors	•
Control Panel Viewing Window	•
Fork Pockets	Δ
Single Lift Point	Δ
Bunding	Δ
Open Frame	Δ
High Density Fire Retardant Foam	•
Yellow Paint	•
White Paint	Δ
Four Point Lift (non CE)	Δ
Standard: • Not Available: x Optional:	: Δ

ALTERNATOR ECP34-1S/4	
Poles	4
Winding Connections	Star
Insulation	Class H
Enclosure	IP23
Exciter System	Self-regulating brushless
Voltage Regulator	AVR
Steady State Voltage Regulation	+/- 1.0%
Bearing	Single bearing sealed
Coupling	Flexible disc
Cooling	Direct drive centrifugal blower fan
Coating	Winding Protection Grey
6	6 ,

STARTING SYSTEM					
Starter Motor	kW	4.20			
Battery Capacity	Ah	120			
Number of Batteries		1			
Auxiliary Voltage	V	12			

ENGINE						
I 500 RPM						
Gross Engine Power (PRP)	kW	74.00				
Gross Engine Power (Standby)	kW	81.40				
	1800 R	PM				
Gross Engine Power (PRP)	kW	74.00				
Gross Engine Power (Standby)	kW	81.40				
Manufacturer and Model		JCB 444 G-TC- 74				
Fuel		Diesel				
Injection		Direct				
Aspiration		Turbo Charged				
Cylinders		4				
Bore and Stroke	mm	103 x 132				
Displacement	L	4.399				
Cooling		Water				
Engine Oil Specification		API CH4-SAE 10W40				
Compression Ratio		17.5 : 1				
Engine Oil Capacity	L	14.00				
Coolant Capacity	L	16.00				
Governor		Mechanical				
Air Filter		Two stage filtration				
Engine Oil Consumption	100% Load	0.1% of fuel consumed				

FUEL SYSTEM				
Diesel Specification		EN590		
Standard Fuel Tank Capacity	L	270		

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FUEL CONSUMPTION			
100% Load Prime	L/h		18.7
75% Load Prime	L/h	5011	14.30
50% Load Prime	L/h	50Hz	10.20
100% Load Standby	L/h		20.10
100% Load Prime	L/h		19.40
75% Load Prime	L/h	60Hz	16.16
50% Load Prime	L/h	6UHZ	11.56
100% Load Standby	L/h		23.52
EXHAUST SYSTEM			
Maximum Temperature 100% Standby	°C		542.00
Exhaust Gas Flow 100% Standby	m <sup>3/</sup> min	50Hz	14.00
Maximum Allowed Back Pressure	mbar		100.00
Maximum Temperature 100% Standby	°C		547
Exhaust Gas Flow 100% Standby	m <sup>3/</sup> min	60Hz	16.60
Maximum Allowed Back Pressure	mbar		100.00
Exhaust Flange Size	mm	64.5	
AIR SYSTEM			
Intake Air Flow 100% Standby	Kg/h		367.00
Total Cooling Air Flow 100% Standby (@ 13 mm H <sub>2</sub> 0 Canopy Depression)	m <sup>3</sup> /s	50Hz	3.3
Alternator Fan Airflow	m³/s		0.32
Intake Air Flow 100% Standby	Kg/h		370.00
Total Cooling Air Flow 100% Standby (@ 16 mm H <sub>2</sub> 0 Canopy Depression)	m <sup>3</sup> /s	60Hz	3.96
Alternator Fan Airflow	m³/s		0.38

MECHANICAL FEATURES			
Cooling Pack			•
Air Filter			•
Mechanical Governor			•
Low Oil Pressure Sender			•
Coolant Temperature Sender			Δ
Low Oil Pressure Sensor			Δ
Oil Temperature Sender			•
Radiator Guards			•
Hot Component Guards			Δ
Manual Oil Drain Pump (Canopy)			Δ
Water Jacket Heater			Δ
Pre-Filter with Separator			•
Mechanical Fuel Level Indicator (Non Cl	E Only)		Δ
Internal Fuel Fill (Belly Tank)			•
3 Way Fuel Valve with Quick Connector	•		Δ
Residential Silencer			•
Industrial Silencer			X
Door Stops			Δ
Canopy Bump Stops			Δ
Bunded Base			Δ
Gravity Oil Drain Pipe			Δ
Larger Fuel Filler Neck			Δ
Electronic Governor			X
Standard: ●	Not Available: x	Optional: $\Delta$	

SOUND PRESSURE (CANOPY ONLY)					
LpA (7m)	50Hz	dB(A)	70		

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ELECTRICAL FEATURES		
AVR DSR		•
AVR DER		X
Winding Protection Standard	X	
Winding Protection Standard +		X
Winding Protection Grey		•
Winding Protection Total		X
Winding Protection Total +		X
MAUX		•
PMG		X
Anti-Condensation Heater		Δ
3 Pole Moulded Case Circuit Breaker	•	
4 Pole Moulded Case Circuit Breaker	Δ	
Earth Leakage Protection (Shunt Trip)		•
Preparation for Earth Connection		•
Optional Voltages		Δ
Synchronisation		X
Emergency Stop Button		•
External Emergency Stop Button		•
Fuel Level Sensor	•	
Ix63A 3 Phase / 3x32A   Phase Socket Box	Δ	
1x63A 3 Phase / 3x32A   Phase / 2x16A   Phase Socket Box	Δ	
1x32A 3 Phase / 2x16A   Phase Socket Box	Δ	
Standard: ● Not Available: x	Optional: A	Δ

BATTERY FEATURES		
Battery Isolator		Δ
Battery Type		Sealed Lead Acid
Battery Size (Ah)		110
Number of Batteries		1
Battery Charger		Δ
Standard	: • Not Available: x	Optional: $\Delta$

JCB COMMUNICATION AND CONTROL				
DSE 4510	X			
DSE 4520	•			
DSE 7320	Δ			
DSE 8610	X			
Live Link For Power	•			
OPTIONAL CE PACK				
EMC Certification	•			
Hot Guards	•			
Belt Guards	•			
Earth Leakage Relay	•			
Sound Power Decal	•			
Sourid Fower Decar				

WEIGHT AND DIMENSIONS			
Length	mm	2850	
Width	mm	1140	
Height	mm	1850	
Shipping Volume (sea ready)	$m^3$	5.95	
Weight*	Kg	1780.00	
#C+			

Not Available: x

#### **REFERENCE STANDARDS**

JCB Generators are CE certified and conform to the following Directives (subject to a country requiring such standard):

- EN 12100, EN13857, EN60204
- 2006/42/CE Machinery safety
- 2006/95/EC Low voltage
- 2004/108/CE Electromagnetic compatibility

Complete Machine Declaration of Conformity

Standard: •

- 2000/14/EC Sound Power Level (amended by 2005/88/EC)
- 97/68/EC Emissions(amended by 2002/88/EC & 2004/26/EC)
- Power according to ISO 8528 and ISO 3046
- Ambient reference conditions 1000mbar, 25°C, 30% relative humidity ISO3046

Information based on standard specification equipment unless otherwise stated.

Optional:  $\Delta$ 

<sup>\*</sup>Standard build with all fluids except fuel